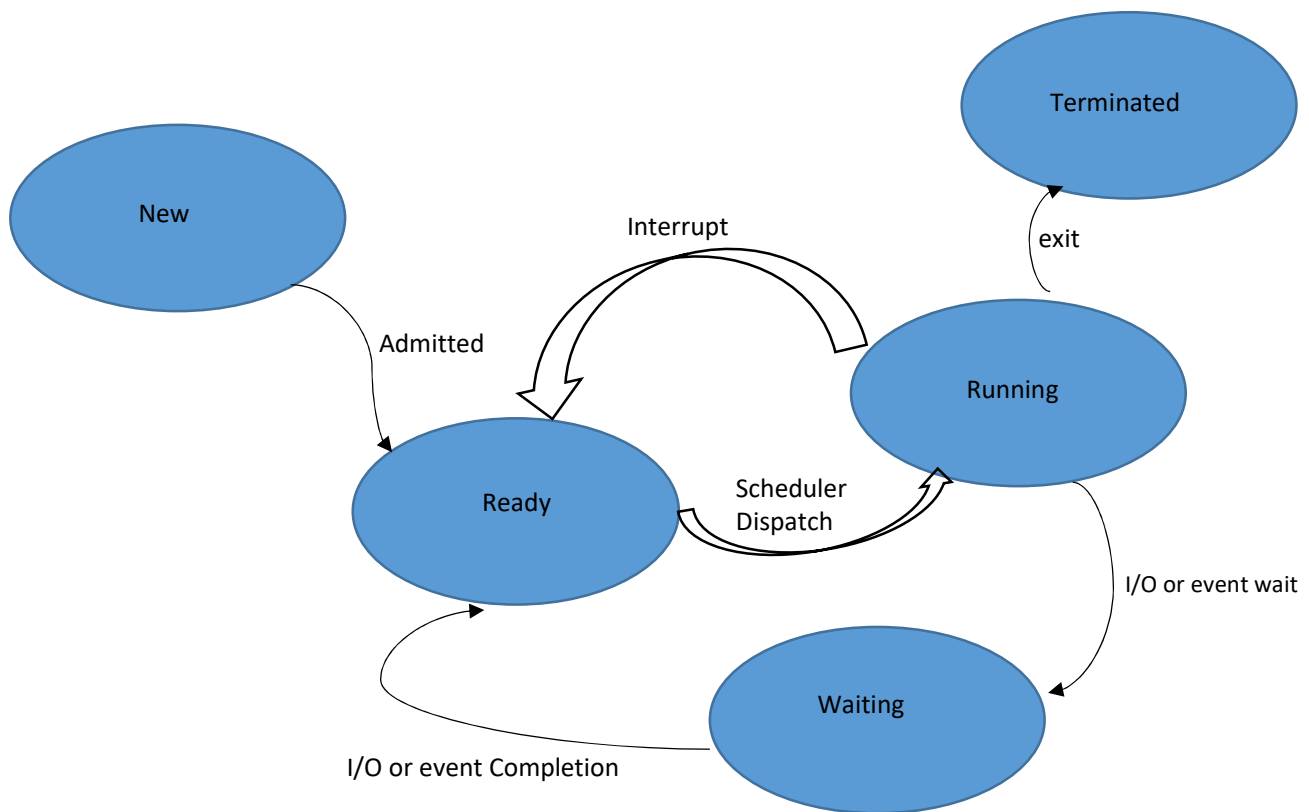


A process is a program in execution

process state:



Burst Time:

Waiting Time:

Turn-around Time / Completion Time:

Process	Burst Time
P1	24
P2	3
P3	3

P1	P2	P3	
0	24	27	30

Process	Burst Time	Waiting Time	Turn-around Time
P1	5	0	5
P2	10	5	15
P3	8	15	23
P4	1	23	24
P5	7	24	31
Average W.T:	13.4		
Average T.A.T:	19.6		

Source Code:

```
#include<stdio.h>
void fwt(int process[], int n, int bt[], int wt[])
{
    wt[0] = 0;
    int i;
    for (i = 1; i < n; i++)
        wt[i] = bt[i - 1] + wt[i - 1];
}
void ftat(int process[], int n, int bt[], int wt[], int tat[])
{
    int i;
    for (i = 0; i < n; i++)
        tat[i] = bt[i] + wt[i];
}
void fat(int processes[], int n, int bt[])
{
    int wt[n], tat[n], total_wt = 0, total_tat = 0;
    fwt(processes, n, bt, wt);
    ftat(processes, n, bt, wt, tat);
    printf("Process\tBurst Time\tWaiting Time\tTurnaround Time\n");
    int i;
    for (i = 0; i < n; i++)
    {
        total_wt += wt[i];
        total_tat += tat[i];
        printf(" P%d\t\t%d\t\t%d\t\t%d\n", i + 1, bt[i], wt[i], tat[i]);
    }
    printf("\nAverage Waiting Time (W.T): %.2f\n", (float)total_wt / n);
    printf("Average Turnaround Time (T.A.T): %.2f\n", (float)total_tat / n);
}
int main()
{
    int n;
    printf("Enter the number of processes: ");
    scanf("%d", &n);
    int bt[n];
    printf("Enter burst time for each process:\n");
    int i;
    for (i = 0; i < n; i++)
    {
        printf("P%d: ", i + 1);
        scanf("%d", &bt[i]);
    }
    fat(NULL, n, bt);

    return 0;
}
```